

Table S1 Unadjusted oncologic characteristics across the three cohorts

Demographic characteristics	Pre-pandemic, 2019 (n=135,649), n (%)	Pandemic-year-one, 2020 (n=119,338), n (%)	Pandemic-year-two, 2021 (n=121,206), n (%)	P value
Primary tumor site				<0.001
Upper lobe	71,314 (52.6)	62,489 (52.4)	63,704 (52.6)	
Middle lobe	62,269 (4.6)	53,395 (4.5)	56,635 (4.6)	
Lower lobe	39,044 (28.8)	34,098 (28.6)	34,893 (28.8)	
Overlapping lesion	16,639 (1.2)	15,587 (1.3)	16,650 (1.4)	
Main bronchus	41,110 (3)	37,771 (3.2)	38,812 (3.1)	
Not specified	13,273 (9.8)	11,998 (10.1)	11,512 (9.5)	
Laterality				0.01
Bilateral	16,641 (1.2)	14,413 (1.2)	13,375 (1.1)	
Left	52,376 (38.6)	46,230 (38.7)	47,022 (38.8)	
Right	74,198 (54.7)	64,791 (54.3)	66,002 (54.5)	
Unknown or N/A	74,434 (5.5)	69,904 (5.8)	68,807 (5.6)	
Histology				<0.001
Adenocarcinomas	78,202 (57.7)	68,574 (57.5)	68,437 (56.5)	
Squamous cell carcinomas	38,497 (28.4)	33,118 (27.8)	34,057 (28.1)	
Epithelial neoplasms	85,540 (6.3)	80,011 (6.7)	82,228 (6.8)	
Other	10,410 (7.7)	96,635 (8.1)	10,484 (8.6)	
Clinical tumor grade				<0.001
Well differentiated	62,206 (4.6)	52,214 (4.4)	52,299 (4.4)	
Moderately differentiated	15,747 (11.6)	13,104 (11.0)	13,933 (11.5)	
Poorly differentiated	10,205 (7.5)	79,988 (6.7)	82,221 (6.8)	
Undifferentiated	193 (0.1)	150 (0.1)	152 (0.1)	
Unknown	103,298 (76.2)	92,882 (77.8)	93,601 (77.2)	
AJCC clinical T stage				<0.001
cT1	48,511 (35.8)	42,152 (35.3)	43,839 (36.2)	
cT2	24,201 (17.8)	20,488 (17.2)	20,622 (17.0)	
cT3	16,917 (12.5)	14,359 (12.0)	14,484 (11.9)	
cT4	23,202 (17.1)	21,354 (17.9)	21,286 (17.6)	
Other/unknown	22,818 (16.8)	20,985 (17.6)	20,975 (17.3)	
AJCC clinical N stage				<0.001
cN0	65,449 (48.2)	56,430 (47.3)	58,818 (48.5)	
cN1	89,962 (6.6)	78,827 (6.6)	78,836 (6.5)	
cN2	29,964 (22.1)	26,075 (21.8)	25,702 (21.2)	
cN3	14,551 (10.7)	13,323 (11.2)	12,863 (10.6)	
Other/unknown	16,723 (12.3)	15,683 (13.1)	15,987 (13.2)	
AJCC clinical M stage				<0.001
cM0	77,932 (57.5)	66,356 (55.6)	69,066 (57.0)	
cM1	30,436 (22.4)	27,203 (22.8)	26,874 (22.2)	
pM1	16,998 (12.5)	15,927 (13.3)	14,836 (12.2)	
Other/unknown	10,283 (7.6)	98,852 (8.3)	10,430 (8.6)	
AJCC clinical stage group				<0.001
Stage 1	41,945 (30.9)	36,075 (30.2)	38,251 (31.6)	
Stage 2	99,961 (7.3)	83,329 (7)	86,647 (7.1)	
Stage 3	21,552 (15.9)	18,201 (15.3)	18,570 (15.3)	
Stage 4	47,234 (34.8)	42,940 (36.0)	41,569 (34.3)	
Other/unknown	14,957 (11.0)	13,793 (11.6)	14,169 (11.7)	

N/A, XXXXXXXXXXXXXXXXXXXX; AJCC, American Joint Committee on Cancer.

Table S2 Unadjusted treatment characteristics across the three cohorts

Treatment characteristics	Pre-pandemic, 2019 (n=135,649)	Pandemic-year-one, 2020 (n=119,338)	Pandemic-year-two, 2021 (n=121,206)	P value
Treatment overview				<0.001
Treatment given	117,889 (86.9)	102,992 (86.3)	104,713 (86.4)	
Active surveillance	792 (0.6)	741 (0.6)	717 (0.6)	
No treatment given	16,968 (12.5)	15,605 (13.1)	15,776 (13.0)	
Surgical diagnostic staging procedure				<0.001
Yes	97,810 (72.1)	85,373 (71.5)	87,397 (72.1)	
No	37,835 (27.9)	33,959 (28.5)	33,804 (27.9)	
Unknown	4 (0)	6 (0)	5 (0)	
Primary surgical procedure				<0.001
Sublobar resection	10,679 (7.9)	9,170 (7.7)	9,744 (8.0)	
Lobectomy	28,083 (20.7)	23,780 (19.9)	24,420 (20.2)	
Pneumonectomy	802 (0.6)	627 (0.5)	502 (0.4)	
Not specified	165 (0.1)	125 (0.1)	129 (0.1)	
No surgery	95,920 (70.7)	85,636 (71.8)	86,410 (71.3)	
Surgical approach				<0.001
Open	10,745 (7.9)	83,335 (7)	75,529 (6.2)	
Minimally invasive	13,395 (9.9)	10,631 (8.9)	10,678 (8.8)	
Robotic	11,954 (8.8)	11,713 (9.8)	13,311 (11.0)	
Unknown if surgery was performed	90 (0.1)	71 (0.1)	101 (0.1)	
None	99,551 (73.4)	88,657 (74.3)	89,681 (74.0)	
Radiation/surgery sequence				<0.001
Radiation before surgery	794 (0.6)	664 (0.6)	673 (0.6)	
Radiation after surgery	53,325 (3.9)	46,620 (3.9)	42,294 (3.5)	
Radiation before and after surgery	60 (0)	69 (0.1)	68 (0.1)	
Radiation, not otherwise specified	26,675 (2)	21,175 (1.8)	20,086 (1.7)	
No radiation	128,872 (95.0)	113,497 (95.1)	115,603 (95.4)	
Systemic therapy/surgery sequence				<0.001
Systemic before surgery	794 (0.6)	664 (0.6)	673 (0.6)	
Systemic after surgery	53,325 (3.9)	46,620 (3.9)	42,294 (3.5)	
Systemic before and after surgery	60 (0)	69 (0.1)	68 (0.1)	
Unknown, other, N/A	598 (0.4)	488 (0.4)	568 (0.5)	
No systemic therapy	128,872 (95.0)	113,497 (95.1)	115,603 (95.4)	
Palliative measures performed				<0.001
Palliative surgery	482 (0.4)	419 (0.4)	435 (0.4)	
Palliative radiation	5,270 (3.9)	4,791 (4.0)	4,546 (3.8)	
Palliative systemic therapy	4,269 (3.1)	4,326 (3.6)	4,262 (3.5)	
Palliative pain management	1,269 (0.9)	1,185 (1.0)	1,284 (1.1)	
Combination palliative therapy	2,989 (2.2)	3,251 (2.7)	34,424 (2.8)	
Palliative care referred, not otherwise specified	1,484 (1.1)	1,538 (1.3)	1,435 (1.2)	
No palliative therapy	119,881 (88.4)	103,826 (87.0)	105,818 (87.3)	
Unknown	5 (0)	2 (0)	2 (0)	
Unplanned readmission within 30 days				<0.001
Unknown	4 (0)	2 (0)	7 (0)	
No	132,198 (97.5)	116,570 (97.7)	118,505 (97.8)	
Unknown	776 (0.6)	593 (0.5)	615 (0.5)	
Days from diagnosis to staging procedure	10.1±30.5	10.4±29.3	10.6±27.3	<0.001
Days from diagnosis to first treatment	42.1±45.1	41.4±45.0	48.2±43.3	<0.001
Days from diagnosis to surgery	41.4±51.7	40.9±51.0	46.1±50.6	<0.001
Days from diagnosis to radiation	63.0±61.6	60.0±57.8	61.3±52.4	<0.001
Days from diagnosis to systemic therapy	58.8±47.0	57.7±46.0	60.8±44.5	<0.001

Data are presented as n (%) or mean ± standard deviation. N/A, XXXXXXXXXXXXXXXXXXXX.